

REMARKS

Claims 5-28, 31-40, and 43-104 are pending, with claims 5, 7, 9, 11, 13, 15, 17, 19, 21, 23, and 53-60 being independent. Claims 1-4, 29, 30, 41, and 42 are cancelled by this amendment without waiver or prejudice.

The specification stands objected to because of informalities. Applicants have amended the specification to address this objection and, accordingly, request withdrawal of the objection to the specification.

The title stands objected to for not being descriptive. Applicants have amended the title to address this objection and, accordingly, request withdrawal of the objection to the title. Please supply a corrected Filing Receipt to the undersigned with respect to this application.

Claims 1-4, 13-24, 41-43, and 47-52 stand rejected under 35 U.S.C. § 102(e) as being anticipated by Aziz et al. (6,392,339) ("the Aziz '339 patent"). With respect to claims 1-4, 41, and 42, applicants have cancelled these claims without waiver or prejudice, thus, rendering the rejection moot with respect to these claims. With respect to the remaining claims, applicants respectfully traverse the rejection.

Independent claim 13 recites a light emitting device that includes an organic light emitting element comprising, a light emitting layer including a first organic compound, a hole transporting layer comprising a second organic compound, and a region including the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer. Applicants respectfully request reconsideration and withdrawal of the rejection because the Aziz '339 patent fails to describe or suggest a region including a first organic compound and a second organic compound between the light emitting layer and the hole transporting layer.

The Aziz '339 patent describes an organic light emitting device as illustrated in Fig. 2. The organic light emitting device 30 includes "a hole transport region 36 composed of a hole transport material (HTM) on the anode 34, a mixed region 38 comprising a mixture of a hole transport material and an electron transport material on the hole transport region 36, an electron transport region 40 composed of an electron transport material (ETM) on the mixed region 38,

and a cathode 42 on the electron transport region 40.” See the Aziz ‘339 patent, col. 4, lines 43-56. Thus, the Aziz ‘339 patent does not describe or suggest a region including the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer, as recited in independent claim 13. Rather, the Aziz ‘339 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

Independent claim 15 recites a light emitting device comprising an organic light emitting element that includes a light emitting layer having a first organic compound, a hole transporting layer including a second organic compound, and a mixed layer including the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer. The Aziz ‘339 patent fails to describe or suggest a mixed layer including the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer. Rather, the Aziz ‘339 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

Independent claim 17 recites a light emitting device comprising an organic light emitting element that includes a light emitting layer including a first organic compound, an electron transporting layer including a second organic compound, and a region including the first organic compound and the second organic compound between the light emitting layer and the electron transporting layer. The Aziz ‘339 patent fails to describe or suggest a region including the first organic compound and second organic compound between the light emitting layer and the electron transporting layer. Rather, the Aziz ‘339 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

Independent claim 19 recites a light emitting device comprising an organic light emitting element that includes a light emitting layer including a first organic compound, an electron transporting layer including a second organic compound, and a mixed layer including the first organic compound and the second organic compound between the light emitting layer and the electron transporting layer. The Aziz ‘339 patent fails to described or suggest a mixed layer comprising the first organic and the second organic compound between the light emitting layer

and the electron transporting layer. Rather, the Aziz '339 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

Independent claim 21 recites a light emitting device comprising an organic light emitting element that includes a light emitting layer including a first organic compound, a hole transporting layer including a second organic compound, an electron transporting layer comprising a third organic compound, a first region including the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer, and a second region including the second organic compound and the third organic compound between the light emitting layer and the electron transporting layer. The Aziz '339 patent fails to describe or suggest a first region that includes the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer and a second region that includes the second organic compound and the third organic compound between the light emitting layer and the electron transporting layer. Rather, the Aziz '339 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

Independent claim 23 recites a light emitting device including an organic light emitting element that includes a light emitting layer including a first organic compound, a hole transporting layer comprising a second organic compound, an electron transporting layer that includes a third organic compound, a first mixed layer that includes the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer, and a second mixed layer that includes the second organic compound and the third organic compound between the light emitting layer and the electron transporting layer. The Aziz '339 patent fails to describe or suggest a first mixed layer that includes the first organic compound and the second organic compound between the light emitting layer and the hole transporting layer and second mixed layer that includes second organic compound and the third organic compound between the light emitting layer and the electron transporting layer. Rather, the Aziz '339 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

For at least these reasons, applicants respectfully request reconsideration and withdrawal of the §102(e) rejection of independent claims 13, 15, 17, 19, 21, and 23, and their respective dependent claims.

Claims 1-4, 13-31, 35-43, 47-68, 81-88, and 90-104 stand rejected under 35 U.S.C. § 102(e) as being anticipated by Aziz et al. (6,392,250) ("the Aziz '250 patent"). With respect to claims 1-4, 29, 30, 41, and 42, applicants have cancelled these claims without waiver or prejudice, thus, rendering the rejection moot with respect to these claims. With respect to the remaining claims, applicants respectfully traverse the rejection.

Similarly to the Aziz '339 patent described above, the Aziz '250 patent describes an organic light emitting device having a similar structure as described in the previous patent. See the Aziz '250 patent, col. 5, lines 11-24, and Fig. 2. Thus, for the reasons discussed above with respect to the Aziz '339 patent, the Aziz '250 patent also fails to describe or suggest the features recited in independent claims 13, 15, 17, 19, 21, and 23.

In a similar manner, with respect to independent claims 53-60, the Aziz '250 patent also fails to describe or suggest the recited claim features for similar reasons. More specifically, for example, independent claim 53 recites a light emitting device including an organic light emitting element that includes, among other features, an organic compound film that includes a hole transporting region, a first mixed region, a light emitting region, a second mixed region and an electron transporting region, that are connected in the order that the hole transporting region is nearest to the anode and the electron transporting region is nearest to the cathode. The Aziz '250 patent fails to describe the first mixed region between the hole transporting region and the light emitting region and a second mixed region between the light emitting region and the electron transporting region. Rather, the Aziz '250 patent describes a mixed region between a hole transporting layer and an electron transporting layer.

Similarly, independent claims 54-60 recite a light emitting device that includes, among other features, the organic compound film that includes a hole transporting region, a first mixed region, a light emitting region, a second mixed region, and an electron transporting region, that

are connected in the order that hole transporting region is nearest to the anode and the electron transporting region is nearest to the cathode.

For at least these reasons, applicants respectfully request reconsideration and withdrawal of the §102(e) rejection of independent claims 13, 15, 17, 19, 21, 23, and 53-60, and their respective dependent claims.

Claims 5-12, 32-34, and 44-46 stand rejected under 35 U.S.C. §103(a) as being unpatentable over the Aziz '339 patent and in further view of So et al. (5,925,980). Applicants respectfully traverse this rejection.

Independent claim 5 recites a light emitting device comprising an organic light emitting element that includes a hole injecting layer having a first organic compound in contact with an anode, a hole transporting layer having a second organic compound, and a region that includes the first organic compound and the second organic compound between the hole injecting layer and the hole transporting layer. Applicants respectfully request reconsideration and withdrawal of the rejection because the Aziz '339 patent and So, either alone or in combination, fail to describe or suggest a region that includes the first organic compound and the second organic compound between the hole injecting layer and the hole transporting layer.

As discussed above, the Aziz '339 patent describes an organic light emitting device 30 that includes "a hole transport region 36 comprising a hole transport material (HTM) on the anode 34, a mixed region 38 comprising a mixture of a hole transport material and an electron transport material on the hole transport region 36, an electron transport region 40 comprising an electron transport material (ETM) on the mixed region 38, and a cathode 42 on the electron transport region 40." See the Aziz '339 patent, col. 4, lines 43-56 and Fig. 2. The Aziz '339 patent does not describe or suggest a region that includes the first organic compound and the second organic compound between the hole injecting layer and the hole transporting layer, as recited in independent claim 5. So does not remedy this failure of the Aziz '339 patent.

Independent claim 7 recites a light emitting device that includes, among other features, a mixed layer that includes a first organic compound and second organic compound between the

hole injecting layer and the hole transporting layer. As discussed above, the Aziz '339 patent and So, either alone or in combination, fail to describe or suggest this feature.

Independent claim 9 recites a light emitting device that includes, among other features, a region having the first organic compound and the second organic compound between the electron injection layer and the electron transporting layer. As discussed above, the Aziz '339 patent and So, either alone or in combination, fail to describe or suggest this feature.

Independent claim 11 recites a light emitting device that includes, among other features, a mixed layer having the first organic compound and the second organic compound between the electron injection layer and the electron transporting layer. As discussed above, the Aziz '339 patent and So, either alone or in combination, fail to describe or suggest this feature.

For at least these reasons, applicants respectfully request withdrawal of the §103(a) rejection of independent claims 5, 7, 9, and 11, and their respective dependent claims.

Claims 69-80, which depend from their respective independent claims 54-56 and 58-60, stand rejected under 35 U.S.C. §103(a) as being unpatentable over the Aziz '250 patent.

Applicants respectfully traverse this rejection. For at least the reasons discussed above with respect to independent claims 54-56 and 58-60 and based on their dependency of these independent claims, applicants respectfully request withdrawal of the rejection of dependent claims 69-80.

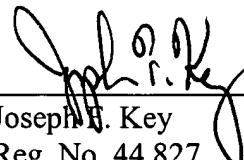
Applicant : Satoshi Seo et al.
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Enclosed is a \$950 check for the Petition for Extension of Time fee. Please apply any other charges or credits to deposit account 06-1050.

Respectfully submitted,

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